

Amendments to the Claims:

This listing of claims replaces all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently Amended) Method for power saving in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN) having an access point (AP), wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating system supporting a plurality of device power states, said method comprising the steps of:

the mobile terminal requesting a transition from an active state to a less active state;

upon which request, the NIC ~~requests~~ sends a request to the AP that the mobile terminal be allowed to be entered into WLAN sleep state; and,

on receiving an acknowledgement from the AP, the mobile terminal enters WLAN sleep state.

2. (Cancelled)

3. (Currently Amended) Method for power saving in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN) in an ad hoc network, wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating system supporting a plurality of device power states, said method comprising the steps of:

the mobile terminal requesting a transition from an active state to a less active state;

upon which request, the NIC ~~requests~~ sends a request to a second mobile terminal in the ad hoc network that the mobile terminal be allowed to be entered into WLAN sleep state; and,

on acknowledgement from the second mobile terminal, the mobile terminal enters WLAN sleep state.

4. (Cancelled)

5. (Currently Amended) Method for power saving in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN), having an access point (AP) wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating system supporting a plurality of device power states, said method comprising the steps of:

the mobile terminal, due to inactivity, requests a transition from an active state to a less active state;

upon which request, ~~the mobile terminal requests~~ NIC sends a request to the AP that the mobile terminal be allowed to be disassociated or de-authenticated from the AP; and,

on acknowledgement from the AP, the mobile terminal enters a disassociated or de-authenticated state.

6. (Cancelled)

7. (Previously Presented) Method according to claim 1 in which the mobile terminal is disassociated or de-authenticated from the AP without using a disassociation or de-authentication signal.

8. (Previously Presented) Method for power saving in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN) in an ad hoc network, wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating

system supporting a plurality of device power states, said method comprising the steps of:

the mobile terminal, due to inactivity, requests a transition from an active state to a less active state;

upon which request the mobile terminal requests a second mobile terminal in the ad hoc network to be disassociated or de-authenticated from the ad hoc network; and,

on acknowledgement from the second mobile terminal, the mobile terminal enters a disassociated or de-authenticated state.

9. (Cancelled)

10. (Previously Presented) Method according to claim 3 in which the mobile terminal is disassociated or de-authenticated from the ad hoc network without using a disassociation or de-authentication signal.

11. (Previously Presented) Method according to claim 1 in which the mobile terminal associates or authenticates to the AP on transition from a less active state to a more active state.

12. (Previously Presented) Method according to claim 3 in which the mobile terminal joins an ad hoc network by associating or authenticating to the ad hoc network on transition from a less active state to a more active state.

13. (Previously Presented) Method for power saving in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN) having an access point (AP), wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating system supporting a plurality of device power states, said method comprising the step of:

the mobile terminal forcing the NIC down to a less active state at a point of time later than a time-out interval due to inactivity as defined in said power save procedures in order to lower the system state.

14. (Original) Method for power saving according to claim 13, in which the method also comprises the step of the mobile terminal forcing the NIC from D3 cold or D3 initialise to a higher power state, when activity is detected or when data is pending for transmission.

15. (Original) Method according to claim 13 in which a timer in the mobile terminal is used to initiate the mobile terminal to power down the NIC.

16. (Original) Method according to claim 1 in which the NIC enters its lowest power consumption mode.

17. (Cancelled)

18. (Previously Presented) Method for power control in a mobile terminal comprising a wireless Network Interface Card (NIC) for accessing a wireless LAN (WLAN) in an ad hoc network, said network comprising at least a second mobile terminal, wherein the WLAN uses HIPERLAN Type 2 or IEEE 802.11 power save procedures and wherein the mobile terminal uses an operating system supporting a plurality of device power states, said method comprising the steps of:

the mobile terminal, in a low power mode, requests transition to an active state;
upon which request the NIC requests the second mobile terminal to be entered into WLAN active state; and,

the mobile terminal enters the WLAN active state on acknowledgement from the second terminal.

19. (Previously Presented) Method according to claim 5 in which the mobile terminal is disassociated or de-authenticated from the AP without using a disassociation or de-authentication signal.

20. (Previously Presented) Method according to claim 8 in which the mobile terminal is disassociated or de-authenticated from the ad hoc network without using a disassociation or de-authentication signal.

21. (Previously Presented) Method according to claim 5 in which the mobile terminal associates or authenticates to the AP on transition from a less active state to a more active state.

22. (Previously Presented) Method according to claim 8 in which the mobile terminal joins an ad hoc network by associating or authenticating to the ad hoc network on transition from a less active state to a more active state.

23. (Original) Method according to claim 3 in which the NIC enters its lowest power consumption mode.

24. (Original) Method according to claim 5 in which the NIC enters its lowest power consumption mode.

25. (Original) Method according to claim 8 in which the NIC enters its lowest power consumption mode.

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